MOAB DISTRICT

OIL AND GAS WORKLOAD ANALYSIS

AND PROGRAM ANALYSIS

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TABLE OF CONTENTS

INTRODUCTION

This analysis is intended to be a manager's tool, a reference, and a baseline. It can be used 1) to review workload, budget, and tables of organization within Utah and 2) to demonstrate Utah's workload to offices outside the state. Effort has been invested to ensure that the analysis includes input from all resource areas and represents the best, most objective assessment possible of the oil and gas program.

Analysis focuses on work that is currently being done. It was initiated by asking program personnel for a list of the major tasks which they are now doing. This list (Appendix B) was used to identify and evaluate indicators which would represent the work being done. After a second meeting to resolve differences, the result was the group of six indicators used in this analysis.

Cyclic and short term workloads (such as planning) were recognized, but not included. All workloads evaluated should be considered to include a considerable amount of paperwork processing and a number of individual tasks. An oil and gas task list is found in Appendix B.

No value judgements are implied. Production amounts, by themselves, were not considered a good indicator of workload because many of the smaller oil and gas operations with less operating capital require more work to acheive compliance objectives. Analysis focuses on what BLM does to manage the oil and gas use, and thus on the workload. For more information on the methodology used in this workload analysis refer to Appendix A.

Finally, in using the workload analysis it should not be viewed as a precision instrument. While it does represent a close approximation of overall workload, managers will need to incorporate any subjective judgements needed to make adjustments for budgeting or personnel decisions. The concept is that these subjective adjustments are better for line managers to identify with staff input, than for staff to incorporate in advance or build into a workload analysis. Subjective factors incorporated in advance would only serve to bias the common data base used by managers.

MOAB OIL AND GAS WORKLOAD ANALYSIS AND PROGRAM EVALUATION

Moab District includes land which is both used, and prospectively useful, for the production of oil and gas. Continued industry interest in these lands focuses attention on BLM and its management of oil and gas exploration and production on public lands. Management can be improved by providing managers with better organized, more usable information when making decisions.

Six significant indicators have been isolated to track work being done in the oil and gas program. They are:

1. Number of Active Wells
2. Number of Active Leases
3. Number of Well Inspections
4. Number of Applications for Permit to Drill (APDs)
5. Number of Sundry Notices
6. Number of Miles of Seismic Line

These indicators were developed through forceful discussion involving all resource areas. Data and workload percentages, by type of work, are shown on page 7. Using the indicators, oil and gas workload is spread as follows:

	Price River	San Rafael	Grand	San Juan	Total
Workload Percentage	11	7	47	35	100

All resource areas within the district have some involvement in all the workload types. Involvement varies mainly in its scale (the number of wells, APDs, etc.) and frequency (how many APDs, miles of seismic line, etc. are in a "normal" year). These factors are reflected in the program size.

The oil and gas program is, by its nature, complex. Complex and changing regulations govern many aspects of the program. The technical nature of oil and gas development as a land use also creates complexity. The task list found in Appendix B helps illustrate the complexity of the program.

Each type of workload is also usually concentrated in two of the four resource areas. The following table illustrates percentages of each type of work found in each resource area.

	Price River	San Rafael	Grand	San Juan	Total
Active Wells	10	4	63	23	100
Active Leases	11	6	59	24	100
Well Inspections	12	6	38	44	100
APDs (1984 to 1986)	7	5	41	46	100
Sundry Notices	10	4	63	23	100
Miles of Seismic Line (1984 to 1986)	6	7	26	61	100

Resource area workload narratives are found on pages 10 and 11.

The cyclic nature of oil and gas activity allows the district to catch up, during slack periods, on items which receive less attention during periods of greater activity. In order to accomodate an increase in variable items (number of APDs, miles of seismic line, etc.), program emphasis changes. For example, inspections of leases which are not ranked high priority based on production, compliance problems or other factors may be reduced during busy years. Priority choices must always be made. Well inspection now makes up the largest part of the workload. Emphasis is now on managing active wells and active leases. A change in the oil and gas market could generate more emphasis on exploration items such as APDs and seismic line.

Workload is compared with cost targets using narrative, tables and diagrams on page 13.

The discussion, findings and recommendations for the eight issues identified by program evaluation are found on pages 14 through 21. In summary, they are:

1. Current data suggests inconsistency in applying the I&E program among the resource areas. Further study by program personnel is needed to determine what quality control measures are needed to correct a problem or what justification exists to maintain the present situation.

2. The Moab District probably has the best possible allocation of positions now, given workload distribution, budget and available skills. Emphasis needs to be placed on continued interaction among the petroleum engineers and the PETs.

3. Moab should make an effort to increase efficiency in the way it distributes and uses its oil and gas budget.

4. There is a perception among program personnel that their program is not understood by others. More information sharing about the program and interaction with personnel from outside the program should help.

5. Greater emphasis should be placed on on-the-job training assignments for oil and gas personnel, particularly those who have already been certified as inspectors. Personnel sharing arrangements, both inside and outside the district, could help to meet this need. This should be very cost effective training.

6. Program personnel effectiveness could be improved through regular meetings directed toward a specific issue or result. The desired results would be: improved efficiency, process consistency, innovations resulting from idea sharing, improved quality control, and improved morale and teamwork.

7. It should be possible to meet both the quality control needs of the district office and improve efficiency in the handling of AIRS data. Direct access to inspection sheets at detached resource area offices should be considered when the necessary personal computers are in place.

8. While the measures agreed upon by district personnel for well inspections and sundry notices can work within the district, they would need to be modified for statewide application.

OIL AND GAS PROGRAM WORKLOAD ANALYSIS FOR RESOURCE AREAS IN MOAB DISTRICT

The Bureau of Land Management has been involved in managing oil and gas activity on public lands for many years. Before merging with Minerals Management Service's Conservation Division, our involvement was confined mainly to providing surface use stipulations, issuing rights-of-way, and overseeing reclamation.

With the merger in March 1983, BLM's responsibilities greatly increased with the size and complexity of its oil and gas program. Tables of organization changed, positions were added or moved, and budgets were increased. Since that time BLM has been making adjustments to better assimilate minerals personnel and improve the effectiveness of the program within the organization.

As BLM adjusted to the changes brought on by the merger, a number of minerals data tracking systems were available for tracking the details of program management, such as Inspection and Enforcement Reports, Monthly Production Reports, AIRS computer data sheets, etc. These reports are all useful to personnel in the program, but are too detailed for the line manager to fully understand, or keep abreast of, the oil and gas program while also managing all other Bureau programs. The following report is intended to meet the line manager's need for a clear, concise, issue-oriented overview that does not dwell on detail.

Analysis was done using the significant indicator approach. The document is designed to be a working reference and a decision makers aid. Analysis was done by manipulating the data and making comparisons, but no attempt was made to incorporate subjective factors or to prejudice future management decisions.

The overall workload for Moab District and for each resource area is portrayed using data and percentages. Individual jobs can be represented by data in one or more categories. To "sum" the different workload categories, points were assigned. The model used to convert data to workload points appears in Appendix A. Weighting factors and significant indicator relationships were established by oil and gas personnel in the district and resource area offices. These relationships are clearly identified in Appendix A.

I. Identification of Significant Indicators

The workload indicators that were considered are grouped where the discussion centered around multiple indicators addressing related concepts or similar jobs. They are also divided into 2 categories, those making the district consensus list and those not. For each indicator accepted the purpose is described.

A. Indicators Accepted

1. Active Wells and Active Leases: Active wells and active leases are intended to represent drilling, production and lease management work resulting from overall oil and gas activity within the resource area.

2. Well Inspections: The number of well inspections addresses field work associated with drilling, production, surface restoration and abandonment.

3. Applications for Permit to Drill (APDs): APDs show work associated with new drilling activity within the resource area. This also indicates industry interest which may lead to an increase in active wells and active leases.

4. Sundry Notices: The number of sundry notices represents the workload associated with the management of activity at existing well locations.

5. Miles of Seismic Line: The number of miles of seismic line represents work associated with geophysical activity in the resource area. This also indicates industry interest which may lead to future drilling.

There are also significant workloads associated with product verification and classifying KGS areas which are not incorporated above because they are handled mainly at the district office. They were not incorporated in the analysis within the district because comparisons among the reource areas would not have been meaningful.

B. Indicators Considered But Rejected

1. Number of KGS Acres Clear Listed*
2. Number of Production Verifications*
3. Number of INCs and Other Written Orders
4. Number of Diligence Reviews
5. Number of Site Security Visits
6. Number of Abandonments
7. Number of Assignments Processed
8. Number of Bonding Reviews Conducted
9. Number of Lease Reviews
10. Number of Production Reports Reviewed
11. Number of Royalty Rate Determinations
12. Number of Environmental Analyses or Categorical Exclusion Reviews
13. Number of Notices of Intent Processed
14. Number of Lease Inspections
15. Number of Visits Per Lease
16. Number of Followup Visits
17. Dollar Value of Assessments
18. Number of Audits or Exceptions
19. Number of Technical Procedural Reviews (on INCs and Written Orders)

* These two indicators are recommended to be carried forward into any statewide workload analysis.

II. Workload Analysis

Data in this section is taken from Inspection and Enforcement Reports and resource area submissions. Analysis is limited to that which can be objectively drawn or infered from the data and is made by comparing the distribution of work among Resource Areas. An indication of the mix of workload by type is also made using the significant indicator categories.

A. Moab District Data and Workload Comparisons

TABLE 1: Moab District Oil and Gas Data by Resource Area

	Price River	San Rafael	Grand	San Juan	Total
Active Wells	91	35	603	220	949
Active Leases	51	28	282	116	477
Well Inspections	62	32	201	234	529
APDs (1984-1986 avg.)	8	6	48	54	116
Sundry Notices	52	21	336	120	526
Miles of Seismic Line (1984 to 1986 avg.)	77	90	362	842	1371

By assigning points to sum the data in the eight different workload categories, percentages can then be generated to show the overall oil and gas workload distribution. For more detail on how workload points were assigned and used, see Appendix A. The distribution of oil and gas workload is shown in Table 2.

TABLE 2: Percentage of the Overall Oil and Gas Workload in Each Resource Area

	Price River	San Rafael	Grand	San Juan	Total
Workload Percentage	11	7	47	35	100

B. Program Complexity

All resource areas within the district have involvement in all the workload areas. Involvement varies mainly in its scale (the number of wells, APDs, etc.) and frequency (how many APDs, miles of seismic line, etc. are in a "normal" year). These factors are reflected in the program size data in the previous section.

The oil and gas program is, by its nature, complex. Complex and changing regulations govern many aspects of the program such as production verification, bonding, assignments and transfers, unitization, lease extensions, enforcement, etc. At times the absence of detailed regulatory guidance can also create complexity in how the program relates to other BLM mandates. For example, regulations in 43 CFR 3045 offer little guidance on resolving conflicts between seismic activity and other resources also covered by federal law. This then forces interpretations and judgements derived directly from laws.

The technical nature of oil and gas development as a land use also creates complexity. Evidence of this is found in the need for constant engineering input into program management and the amount of technological change which has occurred in oil and gas exploration in the last 30 years. Some additional program complexity may be present in Grand and San Juan Resource Areas due to a greater variety of technologies employed in producing oil and gas in the larger fields found in these resource areas. The importance of technical competence in this program is demonstrated by industry's concern over technical training and qualifications within the program.

The task list found in Appendix B also illustrates the complexity of the program. When the number of different types of action which can occur on a given lease or at a well location is coupled with the number of active leases and active wells, the number of combinations possible is extensive. Tracking this workload, and completing it in a timely fashion, creates complexity.

In summary, although differences in program complexity among resource areas are probably not significant within the Moab District, the oil and gas program, itself, is complex.

C. Resource Area Workload Narratives

Information presented in this section is drawn from AIRS computer printouts and data in previous tables.

Information on well status was current in December 1986, and is presented to show a general level of activity within the resource area. Well status is constantly subject to change, so these figures quickly become out-of-date.

The number of fields gives an indication of the number of locations where producing (or potentially producing) wells are managed (Source: Utah Division of Oil, Gas and Mining--modified to correspond to resource area jurisdictions).

Narrative ratings, such as high or low, are assigned based on internal comparisons within Moab District. Where leases are ranked high priority based on "other factors", the ranking is based on recent drilling, being in or near sensitive environmental areas (sensitive view areas, Wilderness Study Areas, etc.), having health and safety concerns beyond what is normal, having associated surface owner agreements, etc. Leases not discussed for each resource in the narratives are are ranked "low priority".

Price River Resource Area

Price River Resource Area has the third largest oil and gas program in the Moab District.

There are seven fields within the resource area. The resource area is most involved in Clear Creek, Grassy Trails, and Peters Point fields. Clear Creek is on National Forest lands and has 18 wells with 2 presently producing gas wells and 2 shut in gas wells. The Grassy Trails field has 22 wells with 8 presently producing oil wells and 5 shut in oil wells. The Peters Point/Jack Canyon field has 19 wells with 5 gas wells presently producing and 5 shut in. The remaining 9 wells are temporarily abandoned or plugeed and abandoned but not yet released.

Well totals for the resource area are: 8 producing oil wells, 7 producing gas wells, 6 shut in oil wells, 17 shut in gas wells and 20 temporarily abandoned wells. There are 25 oil and gas operators in the resource area.

Established production within the resource area is at the low end of moderate (91 active wells and 51 active leases). Current exploration interest is low, averaging 8 APDs and 77 miles of seismic line per year over the last 3 years.

Price River has 8 high priority leases in the resource area. One is based on both the amount of production and compliance problems. A second is based on production and a third is based on compliance problems. The remaining 5 high priority leases are based on other factors.

San Rafael Resource Area

San Rafael Resource Area has the fourth largest oil and gas program in the Moab District.

There are 4 fields within the resource area. Their principal involvement has been with Indian Creek, Last Chance, and Buzzard Bench fields. Indian Creek is on National Forest land and consists of 5 gas wells. Last Chance consists of 3 gas wells which are presently shut in. The Buzzard Bench field consists of 4 shut in gas wells which have not yet produced. All of the above are low pressure wells.

Well totals for the resource area are: 9 producing gas wells, 15 shut in gas wells, and one temporarily abandoned well. There are 17 operators within the resource area.

Established production within the resource area is low (35 active wells and 28 active leases). Current exploration interest is low with averages of 6 APDs and 90 miles of seismic line per year over the last 3 years.

San Rafael has 4 high priority leases. One is based on production and 3 are based on other factors.

Grand Resource Area

Grand Resource Area has the largest oil and gas program in the Moab District.

Grand is involved with 23 fields including such fields as Bar X, Big Indian, Bryson Canyon, Greater Cisco Desert, Lisbon Valley, San Arroyo, and Westwater.

Well totals for the resource area are: 74 producing oil wells, 214 producing gas wells, 2 wells producing both oil and gas, 29 shut in oil wells, 96 shut in gas wells, 52 temporarily abandoned wells, and one well that was drilling or testing within the resource area. There are 74 operators within the resource area.

Established production within the resource area is high (603 active wells and 282 active leases). By itself, Grand accounts for 63 percent of the active wells and 59 percent of the active leases in the district. Current interest in exploration is moderate averaging 48 APDs and 362 miles of seismic line per year over the last 3 years.

Grand Resource Area has 87 high priority leases. Eight are high priority due to both the amount of production and compliance problems. Twenty-nine are high priority based just on compliance problems, while 3 are high priority based on production. Forty-seven are high priority based on other factors.

San Juan Resource Area

San Juan Resource Area has the second largest oil and gas program in the Moab District.

San Juan is involved with 25 fields including Bug, Ismay, Patterson Canyon, Little Valley, Recapture Creek, Tin Cup, and portions of Aneth. Three fields in the resource area represent recent (1986) discoveries placed into production.

Well totals for the resource area are: 68 producing oil wells, 2 producing gas wells, 20 shut in oil wells, 7 shut in gas wells, 10 temporarily abandoned wells, and 16 wells drilling or testing within the resource area. There are 57 operators within the resource area.

Established production within the resource area is at the high end of moderate (220 active wells and 116 active leases). Current interest in exploration is the highest in the district averaging 54 APDs and 842 miles of seismic line per year over the last 3 years, in spite of a depressed oil and gas market.

San Juan Resource Area has 26 high priority leases. Three are based on both the amount of production and compliance problems. Eight are high priority based on compliance problems while five are high priority due to production. Ten are high priority based on other factors.

D. Resource Area Workload Mix by Type

Table 3 displays the percentage of the district workload in each resource area. The percentages are drawn directly from the data presented above. The table may be interpreted as depicting the percentage of each type of workload in each resource area.

TABLE 3: Resource Area Percentages of the Moab District Workload by Type

	Price River	San Rafael	Grand	San Juan	Total
Active Wells	10	4	63	23	100
Active Leases	11	6	59	24	100
Well Inspections	12	6	38	44	100
APDs (1984 to 1986)	7	5	41	46	100
Sundry Notices	10	4	63	23	100
Miles of Seismic Line (1984 to 1986)	6	7	26	61	100

In general, the workload in each category is proportioned out in much the same way as the total workload is (High to low: Grand, San Juan, Price River, San Rafael). The most significant differences are in well inspections, APDs and miles of seismic line. Well inspections are discussed under Inspection and Enforcement in the Issues section (page 14).

San Juan Resource Area has the highest number of APDs and miles of seismic line. They also have the most high priority leases based on production. It is also worth noting that San Juan Resource Area has the most oil and gas fields of any resource area in the district. These factors indicate that San Juan Resource Area is the most likely to have the greatest growth in their oil and gas workload.

E. Districtwide Workload Mix by Type

The workload can also be viewed as a mix of different elements. Using the significant indicator points assigned, Moab's oil and gas workload would be divided as shown in Table 4 below. The percentages provide an approximation of the time the district as a whole (all offices) spends on various aspects of the oil and gas program. For example, the district appears to be spending the highest proportion of its time at present on well inpections.

TABLE 4: Districtwide Workload Mix by Type

Well Inspection	29 percent
Managing Active Wells	25 percent
APD Processing	16 percent
Managing Active Leases	14 percent
Managing Seismic Activity	10 percent
Processing Sundry Notices	6 percent

The percentages in Table 4 should be viewed as very general indicators because many tasks may be represented by more than one indicator. With this in mind, well inspection and the management of active wells appear to account for over half of the district workload under present conditions. At present, APD processing and managing seismic activity comprise about 25 percent of the workload.

APDs and seismic line are dependent on past activity, technology, and the oil and gas market. These factors affect oil company interest. If the oil and gas market were to improve, an increase in the number of APDs and the miles of seismic line would be expected. In 1983, processing APDs and managing seismic activity represented about 40 percent of the workload, rather than the 25 percent it now represents. The cyclic nature of oil and gas activity allows the district to catch up, during slack periods, on items which receive less attention during periods of greater activity.

For example, in 1983, Moab District had 224 APDs and 2,620 miles of seismic line. On the surface, this workload was 9 percent larger than we have at present. But more than that, an increased number of APDs and miles of seismic line changes program emphasis. In order to accomodate an increase, inspections of leases which were not ranked high priority based on production, compliance problems or other factors would be reduced. The whole oil and gas job (or the job in most programs) is never done to 100 percent; priority choices must always be made. Variable items, such as the number of APDs, determine how far down the priority list the district can get.

III. Budget Application of the Workload Analysis

Many of the budget applications are obvious. Where deviations from the apparent relationship between workload and budget occur, clear and explicit reasons can then be identified and evaluated.

Oil and gas program budget allocations for the four resource areas in FY 87 can be figured using work months, average work month costs ($2550), procurement allocations and equipment allocations. These allocations are shown in Table 5 below. Allocations figured in this fashion do leave out some items such as fixed costs, vehicle costs and travel costs, but they provide a close approximation of the overall budget relationships.

TABLE 5: FY 87 Budget Allocations by Resource Area

	FY 87 Budget	Percent of Total
Price River	$ 43,600	12.7
San Rafael	$ 51,250	15.0
Grand	$118,550	34.6
San Juan	$128,750	37.6
Total-All Resource Areas	$342,150	100

The apparent relationship between workload and 1987 budget allocations is portrayed in Figure 1 below.

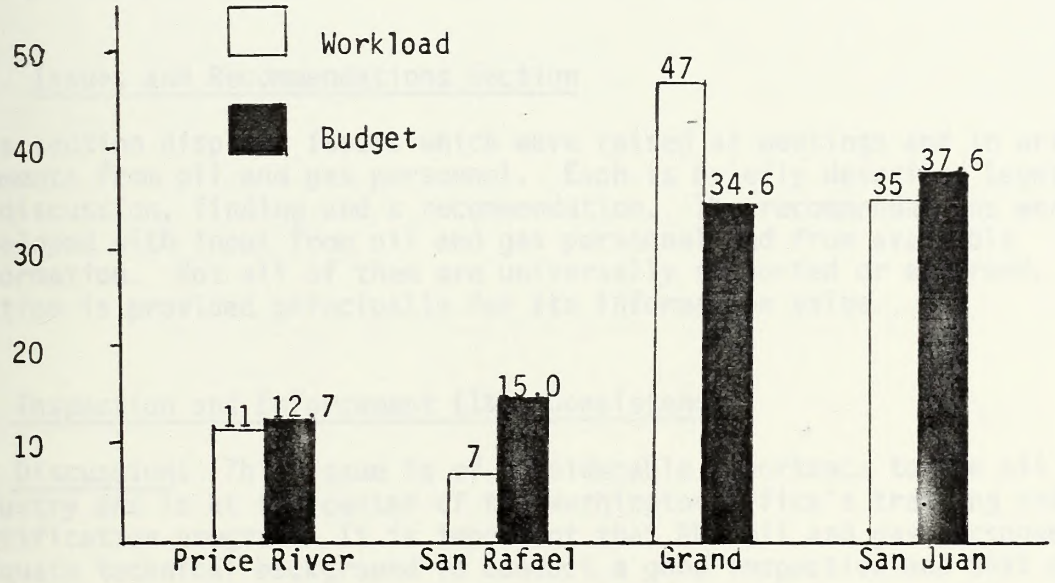

Figure 1: Budget and Workload

The District Office oil and gas budget can also be approximated using work months, average work month costs, procurement allocations and equipment allocations. Using this method, the District office budget would be $288,150. Comparing this figure with the budget figures for the resource areas (developed the same way), the oil and gas budget is split so that the District Office receives 48 percent and the remaining 52 percent is split among the resource areas.

The high percentage of the budget retained in the District Office may be explained based on the way workload is divided between levels. The District Office and the resource areas handle separate pieces of the oil and gas job.

Because the workloads for the two levels are different in so many ways, they are not comparable.

If analysis were expanded to all districts in the state, comparisons could be made. However, even these comparisons could be affected by placement of positions in the different districts. For example, Vernal District would have more options in placing petroleum engineer positions than Moab because the resource areas are located in the same office with the District Office. Thus, the percentage split between the resource areas and the district office in Vernal could be quite different than in Moab District.

The oil and gas program is different than most BLM programs in that the majority of the operational work is not found at the resource area level. Generally, in Utah leasing is done at the state office, KGS determinations and engineering work is done in the district offices and field compliance is done by the resource areas. Wyoming BLM is making changes to move more of the operational work to the resource areas. This is probably easier for Wyoming to do due to the volume and distribution of workload.

IV. Issues and Recommendations Section

This section displays issues which were raised at meetings and in written comments from oil and gas personnel. Each is briefly described together with a discussion, finding and a recommendation. The recommendations were developed with input from oil and gas personnel and from available information. Not all of them are universally supported or endorsed. This section is provided principally for its information value.

A. Inspection and Enforcement (I&E) Consistency

1. Discussion: This issue is of considerable importance to the oil and gas industry and is at the center of the Washington Office's training and certification program. It is important that BLM oil and gas personnel have adequate technical background to conduct a good inspection and that enforcement be handled fairly and consistently. These factors impact the effectiveness of the I&E program and industry perceptions concerning BLM's professionalism.

Skill levels appear to be adequate and/or accessible for all resource areas. Skill levels also continue to improve through the training and certification process. There is little doubt that program personnel and managers are making every effort to be fair and reasonable. However, there appears to be some inconsistency among the resource areas in their approach to the I&E program.

To get a reading on I&E consistency among resource areas, the ratio of inspections to active wells is portrayed below in Table 6. The ratio can be read as the number of inspections for every 10 wells.

TABLE 6: Relationship of Inspections to Active Wells

Resource Area	Inspections	Active Wells	Ratio
Price River	62	91	7 to 10
San Rafael	32	35	9 to 10
Grand	201	603	3 to 10
San Juan	234	220	10 to 10

No consistent relationship is obvious between active wells and inspections. San Rafael (a small program) and San Juan (a moderately large program) are at one end of the spectrum with a high frequency of inspection. Price River Resource Area is in the middle and Grand Resource Area has a low frequency of inspection.

The apparent conclusion would be either 1) San Juan and San Rafael have more budget and personnel time available per active well and therefore do more inspections, 2) there is a difference in emphasis on inspections among resource areas or 3) inspections are too variable (in fact, or due to differences in reporting) to be a good workload measure. All these conditions could be involved. The question then becomes, "Are there factors which justify this situation?"

If APDs are considered, in addition to active wells, the relationship changes only slightly, as shown in Table 7. Grand Resource Area remains at the low end and San Juan at the high.

TABLE 7: Relationship of Inspections to Active Wells plus APDs

Resource Area	Inspections	Active Wells Plus APDs	Ratio
Price River	62	99	6 to 10
San Rafael	32	41	8 to 10
Grand	201	651	2 to 10
San Juan	234	274	9 to 10

Enforcement information shows a similar pattern. The ratio in Table 8 is the number of enforcement actions per 10 active wells.

TABLE 8: Relationship of Enforcement Actions to Active Wells

Resource Area	INCs Issued FY 86	Other Written Orders Issued	Total Actions	Active Wells	Ratio
Price River	20	2	22	91	2.4 to 10
San Rafael	0	0	0	35	None
Grand	64	10	74	603	1.2 to 10
San Juan	37	48	85	220	3.9 to 10
Totals	121	60	181	949	1.9 to 10

Some difference in the numbers of enforcement actions issued by the four resource areas would be expected. The amount of activity at a well site and variations in the operators' approach to meeting regulatory and stipulated requirements are items outside of BLM's control. Yet these influence the need for enforcement action. Clearly, no one wants the total consistency which might be achieved through a strict standard or quota.

However, the degree of difference among the resource areas suggests that enforcement actions may also be affected by budget, personnel time and/or management emphasis in the same way inspections are affected. Positions do not appear to be a factor because Grand has a higher number of people and a lower number of inspections and enforcement actions than San Juan Resource Area.

Allowances for differences in style among the resource areas can be argued if the styles are effective. But in the face of industry and Washington Office concern over I&E consistency, the allowances cannot be too liberal. Furthermore, issuance of INCs and written orders is generally not discretionary under BLM regulations (43 CFR 3163).

Some differences may be explainable. For example, San Rafael has a high number of inspections but no enforcement actions. A possible explanation might be that due to the small number of wells and the limited activity (production and other), no incidents occurred that called for enforcement action.

It is also interesting to note the relationship between enforcement actions and the number of high priority leases due to compliance problems (FC leases). For example, while San Juan has fewer FC leases (8) than Grand (29), San Juan issued more enforcement orders (INC and other) than Grand.

Insufficient information is available at this writing to determine whether the inconsistencies among resource areas in their approach to I&E are justifiable.

2. Finding: Current data suggests inconsistency among the resource areas in applying the I&E program, probably due to style at the resource area level. Inconsistency could adversely affect the district's relationship with industry, particularly when the same companies operate in more than one resource area. Further study by program personnel is needed to determine what quality control measures are needed to correct a problem or what justification exists to maintain the present situation. District Manager and Area Manager support is needed to evaluate this situation and implement needed changes.

3. Recommendation: A periodic quality control check of enforcement actions should be made by the district office and recommended changes should be implemented. Better consistency in monthly reporting may also be needed.

B. Placement of Personnel

1. Discussion: The issue raised was whether positions were correctly placed within the district. Table 9 shows the placement of personnel within the oil and gas program in the Moab District. The positions listed are only those which are primarily devoted to oil and gas.

TABLE 9: Personnel Placement by Resource Area and Type of Position

Office	Nat. Res. Specialist	Petroleum Technician	Petroleum Engineer	Geologist	Clerk	Supervisor	Total
Price River	1	*	0	0	0	1	2
San Rafael	1	*	0	0	0	1	2
Grand	2	1	0	0	0	1	4
San Juan	1	1	0	0	0	1	3
District	0	0	2	1	2	1	6
Totals	5	2*	2	1	2	5	17

The Natural Resource Specialists assigned to Price River and San Rafael Resource Areas are also qualified as Petroleum Technicians (PETs--See * above.) and are certified to do detailed inspections. The other three Natural Resource Specialist positions work primarily in surface protection or on nondetailed inspections. These three positions serve as backup inspectors to the primary inspectors for each resource area.

The geologist in San Juan Resource Area (not listed above) also serves as a backup inspector, in addition to the position's non-oil and gas duties. There are geologist positions in Grand and San Rafael Resource Areas (not in Price River), but these positions don't work much in oil and gas and are not qualified as inspectors.

In addition to the positions shown in Table 9, the district office has an I&E Coordinator who works in fluid minerals. The resource area supervisors shown in the table are not dedicated entirely to oil and gas. They have other program supervision responsibilities such as realty, coal and mining claims. Some clerical support is provided at the resource areas, but in no resource area is a clerical position devoted primarily to the oil and gas program.

Three alternative approaches to position placement are possible: 1) decentralize positions from the District Office to the resource areas, 2) centralize positions to the District Office, and 3) leave positions as they are. The issue revolves primarily around petroleum engineer and PET positions.

a. Decentralization would involve moving petroleum engineers and applications clerks to the resource areas, together with approval authority on APDs, KGS classification, diligence review, data entry, etc. This approach has been taken in some BLM Districts. With 2 petroleum engineers and 2 applications clerks, the existing positions would logically be placed in Grand and San Juan Resource Areas due to program size.

To cover engineering and clerk duties for the other 2 resource areas, either expertise would be borrowed from another resource area (probably Grand) or positions in the Price office would be changed. There seems to be little value in centralizing skills for 3 of the 4 resource areas in Grand Resource Area rather than the District Office. It would only place the skills across town in Moab and require the resource areas in Price to coordinate through Grand resource area

rather than the District Office. San Juan Resource Area could benefit from having engineering skills more readily available.

The workload in Price does not, at present, justify adding positions, so positions would have to be restructured. This is expected to involve combining oil and gas staff positions and converting one of the NRS positions to an entry level petroleum engineer. One of the present clerical positions in Price would then be trained to handle the duties of an Applications Clerk. With position restructuring in Price, personnel would be closer to the area of oil and gas activity in all resource areas. Coordination among petroleum engineers and petroleum technicians would be easier. The oil and gas program may "merge" better with other resource area programs.

Problems with decentralization are: 1) positions would be less efficiently used because workload is uneven among the resource areas 2) placing one resource area over a program for three quarters of the district is organizationally undesireable, 3) distances to the oil and gas activity would only be improved in one resource area unless positions were reorganized in Price, 4) if positions were restructured in Price, the clerical staff could not absorb the additional workload, 5) if positions were restructured in Price, the need for a backup inspector in Price would need to be addressed, and 6) quality control and coordination among resource areas could become more difficult due to their location in the different offices.

b. Centralization would move the two petroleum technician (PET) positions into the District Office. There is a strong consensus that surface protection positions (Natural Resource Specialists) should remain at the resource area level due to the need for site specific expertise, management plan familiarity and constant interaction with other program specialists.

Centralization could improve coordination between petroleum engineers and PETs and consistency in the I&E program because they would be licated together. The two PET positions in the District Office could be directed to work on program priorities without regard to resource area boundaries.

With the present mix of employees, there is a PET qualified inspector in each resource area. Unless that mix changed, skills in Price would be underutilized because people qualified to do both PET and surface protection work would only be doing surface protection work. For all resource areas except Grand, the distance to oil and gas activity areas would be increased. This would increase travel time and travel costs. It may also decrease responsiveness to more remote workloads.

Further centralization would seperate most of the oil and gas program personnel from other resource personnel in the resource area. Integration of the oil and gas program into the multiple use framework of the resource areas would be more difficult. If positions are moved from the resource areas, the flexibility of the Area Managers in responding to surface protection related workloads in realty would also be reduced.

c. Leaving positions as they are centralizes scarce skills such as petroleum engineering and applications clerk work. It is organizationally sound,

centralizing skills used by three or more resource areas at the district level. At the same time positions which are field oriented, such as PET and surface protection position, are located near the work at the resource area offices.

Interaction with other programs at the resource area level appears to be good. In Price River and San Rafael, the oil and gas positions also work in other resource area programs such as realty. This interaction contributes to the merging of the oil and gas program into the overall resource area program.

No coordination problems between petroleum engineers and PETs were identified, although the availability of petroleum engineers for field problems in San Juan Resource Area was discussed.

2. Finding: The Moab District probably has the best possible allocation of positions now, given workload distribution, budget and available skills. Continued emphasis needs to be placed on interaction among the petroleum engineers and the PETs to promote I&E consistency and coordination.

3. Recommendation: Stay with the present placement of positions.

C. Adjustments to Funding Based on Workload

1. Discussion: There is general agreement that we need to phase into a more efficient distribution of funding. The perception is that workload and funding are not always directly related, particularly where funding seems to emphasize covering positions on board.

With the analysis presented in the position discussion above, the problem does not appear to be in the design or location of positions. Many oil and gas program positions are not entirely devoted to oil and gas, with good justification. It appears more likely that funding in other subactivities, particularly realty, influences the need for oil and gas to cover more than their share of some positions and less than they should of others. Some swapping of funds in these subactivities among resource areas might lead to a more efficient work month allocation.

Support needs may also influence budget distribution. In each resource area, manager, supervisor and clerical support must be covered. For smaller programs, this may represent a slightly higher percentage of their funding. In some resource areas, the supervisory position may need to be supported to a greater degree in order to cover work which can not be handled by other program positions.

2. Finding: Moab should make an effort to increase efficiency in the way it uses its oil and gas budget. One measure to consider is to allocate oil and gas funds based on workload and then look more to other subativities to make resource area adjustments. The outcome in at least some cases is likely to be a swapping of funds in different subactivities among resource areas. (Using subactivities to make adjustments would probably not be necessary if the

district compiled similar information for all subactivities, which could be used in budgeting.)

3. Recommendation: Seek ways to make the distribution of funding more closely approximate the distribution of workload.

D. Increase Internal Understanding of the Program.

1. Discussion: The perception exists that some employees do not have a very clear understanding of the oil and gas program. The concern is that the diversity and complexity of the work within the program are not recognized leading to oversimplified notions about the program.

The perceived harm in this is that the program does not receive all the consideration it is due. This is apparently a common post-merger symptom, bureauwide. The solution is probably found in more information sharing and interaction. Oil and gas program personnel can help promote understanding by producing short, issue-related, boiled-down staff reports for non-program personnel and managers. News releases, such as the one released each year by San Juan Resource Area, are also a good idea. It would also be beneficial to promote more multiple discipline on-site visits and in-office projects.

2. Finding: There is a perception among program personnel that their program is not understood by others.

3. Recommendation: Increase information sharing about the program. (This report could help.) Increase interaction of other program personnel and managers with oil and gas program personnel.

E. Training

1. Discussion: Training priorities are greatly influenced by certification requirements set by the Washington Office. Formal training is often determined by available dollars and certification needs. On-the-job training (OJT) does not receive sufficient emphasis. The comparison was made that sometimes 2 to 3 days of OJT with a well qualified individual or on a large or unfamiliar project can be of more value than 2 or 3 weeks of formal classroom training. A preference was expressed for industry training courses offered in Roosevelt over those at Phoenix Training Center. Interestingly, these training options are likely to be less costly as well.

2. Finding: More personnel sharing could occur between resource areas. Efforts should be made to set up training details in other districts with large amounts of oil and gas activity or unusual situations. These types of training may be particularly appropriate and cost effective for individuals who have already completed certification requirements. Some of these details might be worked out as exchanges.

3. Recommendation: Greater emphasis should be placed on on-the-job training assignments for oil and gas personnel.

F. Team Effectiveness

1. Discussion: Program personnel felt their effectiveness individually and as a group could be enhanced through better communication. Meetings directed toward a specific issue or product were considered to be the most effective. The advantages of meeting regularly were expressed as the ability to achieve:

a. improved efficiency,
b. process consistency,
c. innovations resulting from idea sharing,
d. improved quality control, and
e. improved morale and teamwork.

2. Finding: Regular meetings among program personnel are advantageous. Those meetings need to be directed toward achieving a specific result. An agenda and a followup meeting summary would help ensure a results-oriented meeting.

3. Recommendation: Set up meetings when an appropriate issue or task is available. Promote regular visits to the resource areas by the petroleum engineers.

G. Data Entry into the AIRS Computer Program

1. Discussion: There are a number of concerns which revolve around data entry into the Automated Information Retrieval System (AIRS). They are:

a. When this study was initiated, there was a backlog of data which had not yet been entered into AIRS. At least part of the backlog is probably attributable to conversion of dataa from the old MSl system. Bottlenecks of this magnitude are not likely to occur again in the foreseeable future.

b. The district office is reluctant to have resource area personnel involved in entering AIRS data because of quality control concerns.

c. The district has converted the AIRS data base to personal computers. This has eliminated direct resource area access to the data. To retrieve inspection sheets, the resource areas must request them from the district office.

d. The resource areas update and make corrections on inspection forms when they inspect a well site and send them to the district office for review and entry.

e. The resource areas then request inspection sheets back from the district as needed. Normal turn around time is 2 days from receipt in the district office.

f. Updated inspection sheets are sent to the resource areas as requested. One comment received is that not all of the information sent is always needed. More sellective printing from the data base might shorten the time needed to produce updated sheets.

The district office's concern about quality control is appropriate. However, it is less clear whether placing data entry in the district office is the correct solution. Data is shipped from the resource areas to the district office and then back again for resource area use. The data is also forwarded to the Denver Service Center for inclusion in the bureauwide data base. Districtwide quality control must be accomplished before data is shipped to Denver.

Entry of the data at the district office is the most efficient way to get data into the system. Entry at the resource area, would require an additional task of resource area personnel who should be concentrating on field compliance. It is preferable to spend the clerical time and handle all entry for the district in a single batch rather than divert NRS/PET time from field compliance. Clerical support for this task is not be adequate at resource area offices to absorb these duties.

The primary disadvantage of the present arrangement is in the time lag in getting inspection sheets from the district office when preparing to visit a well site. This would be particularly true for short notice visits. This problem could be solved be setting up resource area access so they can again pull their own inspection sheets. This is probably most important for San Juan Resource Area due to the size of their program and their location in Monticello. It would also be important to Price River and San Rafael (located in Price). Grand can go across town and pick up inspection sheets as needed now.

Personal computers need to be available in all resource areas before resource area access could be considered. At present, the only resource area office with a Philips personal computer is Price. This computer is nearly fully utilized now by other programs.

If backlogs occur again, resource area personnel might be used to help enter data with proper training and supervision. Backlogs are most likely to occur only if there is a large increase in oil and gas activity. One concern with resource area data entry is that it may not be an effective use of PET time.

2. Finding: It should be possible to meet both the quality control needs of the district office and improve efficiency in the handling of AIRS data.

3. Recommendation: Direct access to inspection sheets at detached resource area offices should be considered when the necessary personal computers are in place.

H. Statewide Application and Inspections/ Sundry Notices

1. Discussion: Most site visits to a well other than detailed inspections are addressed by the number of active wells, active leases, APDs or sundry notices. All offices will have some unusual cases when an access road, drillsite or well activity requires a higher than normal number of visits. As a comparative measure these cases are not localized enough or pervasive enough

to require counting all well site visits as inspections. Counting all visits makes the number of well inspections a less objective number because it is much more subject to increases or decreases based on management style or available personnel time.

A breakdown of the number of sundry notices does not exist now. A new set of numbers will need to be tracked by resource area and district. The tracking job will only be complicated by having to separate field work sundry notices from others. Because paperwork sundry notice are likely to be fairly evenly distributed across well sites, there is little advantage to adding complexity by separating different types of sundry notices.

2. Finding: While the measures agreed upon by district personnel for well inspections and sundry notices can work within the district, they would need to be modified for statewide application.

3. Recommendation: Modify these workload measures if they are used statewide.

APPENDIX A
THE MOAB DISTRICT OIL AND GAS WORKLOAD MODEL

V. How The Workload Analysis Was Developed

In evaluating the oil and gas workload in Moab District, the approach used was designed to allow for broad based input and group decision making by program personnel. The following process was used.

1. A workload analysis development meeting was held to develop a consensus proposal.

2. A second meeting (2 hours) was used to resolve differences.

3. Consensus decisionmaking was used at both meetings.

4. Questionaires were used to gather information.

The district meetings were mainly devoted to reviewing the district workload by listing tasks, developing preferred indicators for those tasks, narrowing the list of indicators, and the ranking of indicators by assigning 100 points among them. As time allowed, recommendations to management and program related issues were discussed. An attempt was also made in each meeting to generate ideas on what could be done better or differently.

Since the meetings, I have worked to obtain and evaluate data and produce this document. I have used the workload indicators and weightings assigned by the statewide meeting.

I. Identification of Significant Indicators

This section describes the workload indicators that were considered. They are grouped where the discussion centered around multiple indicators addressing related concepts or similar jobs. They are also divided into 2 categories, those making the district consensus list and those not. I have tried to paraphrase significant parts of the district discussion which portray the underlying concepts.

A. Indicators Accepted

1. Active Wells and Active Leases

There is clear agreement among the resource areas that active wells and active leases are a good indicator of the level of oil and gas activity within a resource area. They also affect workload in many of the other workload indicator areas. The importance of these 2 indicators can be illustrated by reviewing the task list found in Appendix B. Clearly, much of the oil and gas workload is related to these 2 variables. It is for this reason that these workload indicators were heavily weighted (27 points out of 100).

Purpose: Active wells and active leases are intended to represent drilling, production and lease management work resulting from overall oil and gas activity within the resource area.

Data Source: Yearly Inspection and Enforcement Report

2. Well Inspections

The oil and gas program has field compliance requirements which are well defined in BLM policy and regulation. This workload measure is intended to capture oil and gas field work, whether it is associated with the initial drilling of a well, production, surface restoration or abandonment.

There was discussion of counting only detailed inspections. The advantage of counting only these is that the number is objectively determined based on the level of oil and gas activity in the resource area. It is not normally subject to change based on management style or available personnel. The disadvantage is that it does not capture all visits to a well location.

Because differences in management style and available personnel can affect how many inspections are done, it is necessary to consider well inspections in combination with the number of active leases, active wells and sundry notices. A relatively high number of inspections without a similarly high number of active wells, active leases or sundry notices would indicate that a) more personnel time is available to oil and gas personnel in the resource area for this type of work (absence of work in other areas), b) a difference in management emphasis within the program at different offices or c) unusual circumstances. For this reason, ratios among these items are developed in this report.

Purpose: The number of well inspections addresses field work associated with drilling, production, surface restoration and abandonment.

Data Source: End of year I & E reports. For this report, the FY 87 Strategy numbers were used, because the 1986 end of year report was not broken down by resource area.

3. Applications for Permit to Drill (APDs)

An indicator was needed to show new drilling activity within each resource area. APDs are the most direct measure. This measure would include all work associated with processing an APD from the pre-staking stage through production and/or abandonment. Because APDs represent new drilling, the number can vary with fluctuations in the oil and gas market. A three year average is used in order to give some stability to the number from year to year. A five year average was not used because that would make the number too slow in responding to change. Seperate measures are included to cover individual actions during the life of a well (sundry notices) and field inspections.

Purpose: APDs show work associated with new drilling activity within the resource area.

Data Source: Progress Reports

4. Sundry Notices

The number of sundry notices was limited to those requiring field work. Most others require less work to process. Sundry notices give an indication of the workload associated with the management of activity at existing well sites, in contrast to the number of APDs received which shows new drilling activity.

The primary difficulty associated with counting sundry notices is that no breakdown of the total number for the district by resource area exists. Furthermore, district oil and gas personnel would like to limit the count to sundry notices requiring field work. These two factors will require a new set of numbers to be generated.

Purpose: The number of sundry notices represents the workload associated with the management of activity at existing well locations.

Data Source: The number of sundry notices for the district is prorated across the resource areas based on the number of active wells.

Oil and gas personnel will begin tracking the number of sundry notices requiring field work in each resource area in 4/87

5. Miles of Seismic Line

The number of miles of seismic line represents work associated with geophysical activity in the resource area, including both office and field portions. The number of Notices of Intent was considered as an indicator, but the number of miles of seismic line was considered to be a more representative measure of geophysical activity and the work associated with it.

Purpose: The number of miles of seismic line represents work associated with geophysical activity in the resource area.

Data Source: Resource Area data compiled from Notices of Intent

B. Indicators Considered But Rejected

1. Number of KGS Acres Clear Listed*
2. Number of Production Verifications*
3. Number of INCs and Other Written Orders
4. Number of Diligence Reviews
5. Number of Site Security Visits
6. Number of Abandonments
7. Number of Assignments Processed
8. Number of Bonding Reviews Conducted
9. Number of Lease Reviews
10. Number of Production Reports Reviewed
11. Number of Royalty Rate Determinations
12. Number of Environmental Analyses or Categorical Exclusion Reviews
13. Number of Notices of Intent Processed
14. Number of Lease Inspections
15. Number of Visits Per Lease
16. Number of Followup Visits
17. Dollar Value of Assessments
18. Number of Audits or Exceptions
19. Number of Technical Procedural Reviews (on INCs and Written Orders)

* These two indicators are recommended to be carried forward into any statewide workload analysis.

D. Relationships Among the Significant Indicator Categories

Active wells and active leases are the broadest indicators giving an overall picture of ongoing oil and gas activity in the resource area. Sundry notices represent individual actions at an existing (active) well. Applications for permit to drill (APDs) indicate new drilling activity while the number of miles of seismic line may give some indication of the prospects for future drilling in an area. The workloads associated with sundry notices, APDs and Notices of Intent (seismic lines) are generally separate while a well inspection may be related to a sundry notice, an APD or any activity at an active well.

That relationship among the indicators can also be portrayed as the number of measured units required to increase the workload ranking by one point. To increase the workload ranking by one point would require one of the following:

25 Active Wells
12 Well Inspections (any visit to a well site)
5 APDs
25 Active Lease
60 Sundry Notices reqiring field work
100 Miles of Seismic Line

Using the Significant Indicator system to sum the dissimilar workloads, the result would be as shown in Table A1 below.

TABLE A1: Workload Points and Point Totals by Resource Area

	Price River	San Rafael	Grand	San Juan	Total
Active Wells	4	2	25	9	40
Active Leases	6	3	17	20	46
Well Inspections	2	2	10	11	25
APDs (1984 to 1986)	3	2	12	5	22
Sundry Notices	1	1	6	2	10
Miles of Seismic Line (1984 to 1986)	1	1	4	9	15
Sum	17	11	74	56	158

By using the summation numbers in the bottom row of Table A1, a percentage of the district workload can be derived for each resource area. The distribution of oil and gas workload is shown in Table A2.

TABLE 2: Percentage of the Overall Oil and Gas Workload in Each Resource Area

	Price River	San Rafael	Grand	San Juan	Total
Workload Percentage	11	7	47	35	100

The totals in each column can also be used to derive percentages which give a general indication of the mix of work in each resource area or in the district. The differences among the resource areas should also indicate, in general, how time is being spent. The percentages in Table 4 (below) are derived from workload points assigned to each resource area using the data in Table A1.

TABLE 4: Percentages Showing Resource Area Emphasis By Workload Type

	Price River	San Rafael	Grand	San Juan	District
Active Wells	25	18	34	12	25
Active Leases	19	18	16	6	14
Well Inspections	31	27	23	39	29
APDs (1984 to 1986)	13	18	13	21	16
Sundry Notices	6	9	9	4	6
Miles of Seismic Line (1984 to 1986)	6	9	5	18	10
Total	100	100	100	100	100

The model used to convert data to points follows.

OIL AND GAS ANALYSIS FOR MOAB DISTRICT

w many RAs will be analyzed (up to 4)? 4

WORKLOAD	POINTS
1. ACTIVE WELLS	
	26
626 to 650	25
601 to 625	24
576 to 600	23
551 to 575	22
526 to 550	21
501 to 525	20
476 to 500	19
451 to 475	18
425 to 450	17
401 to 425	16
376 to 400	15
351 to 375	14
326 to 350	13
301 to 325	12
276 to 300	11
251 to 275	10
226 to 250	9
201 to 225	8
176 to 200	7
151 to 175	6
126 to 150	5
101 to 125	4
76 to 100	3
51 to 75	2
26 to 50	1
1 to 25	0
None	
2. WELL INSPECTIONS	
	22
253 to 264	21
241 to 252	20
229 to 240	19
217 to 228	18
205 to 216	17
193 to 204	16
181 to 192	15
169 to 180	15
169 to 180	13
145 to 156	12
133 to 144	11
121 to 132	10
109 to 120	9
97 to 108	8
85 to 96	7
73 to 84	6
61 to 72	5
49 to 60	4
37 to 48	3
25 to 36	2
13 to 24	1
1 to 12	0
No inspections	

3. APPLICATIONS FOR PERMIT TO DRILL (APDs)-3 year average

Over 85	18
81 to 85	17
76 to 80	16
71 to 75	15
66 to 70	14
61 to 66	13
56 to 60	12
51 to 55	11
46 to 50	10
41 to 45	9
36 to 40	8
31 to 35	7
26 to 30	6
21 to 25	5
16 to 20	4
11 to 15	3
6 to 10	2
1 to 5	1
No APDs	0

4. ACTIVE LEASES

Over 325	14
301 to 325	13
276 to 300	12
251 to 276	11
226 to 250	10
201 to 225	9
176 to 200	8
151 to 175	7
126 to 150	6
101 or 125	5
76 or 100	4
51 to 75	3
26 to 50	2
1 to 25	1

5. SUNDRY NOTICES

Over 420	8
361 to 420	7
301 to 360	6
241 to 300	5
181 to 240	4
121 to 180	3
61 to 120	2
1 to 60	1

6. MILES OF SEISMIC LINE-3 year average

Over 1100 miles	12
1001 to 1100 miles	11
901 to 1000 miles	10
801 to 900 miles	9
701 to 800 miles	8
601 to 700 miles	7
501 to 600 miles	6
401 to 500 miles	5
301 to 400 miles	4
201 to 300 miles	3
101 to 200 miles	2
1 to 100 miles	1
No seismic in the last 3 years	0

OIL AND GAS ANALYSIS FOR MOAB DISTRICT

	RA# 1	RA# 2	RA# 3	RA# 4	SUM
ACTIVE WELLS	4	2	25	9	40
INSPECTIONS	6	3	17	20	46
APDs-3 yr.	2	2	10	11	25
ACT LEASES	3	2	12	5	22
SUN. NOTICE	1	1	6	2	10
SEISMIC-3 yr	1	1	4	9	15
SUM	17	11	74	56	158

APPENDIX B
OIL AND GAS TASK LIST

Pre-Lease Work

Processing Notices of Intent (NOIs)
KGS Clear Listing
Geologic Evaluation
Engineering Evaluation
Parcelling for Lease
Drainage Identification
Planning

Drilling Work

Reviewing Notices of Staking (NOSs)
Conducting On Site Inspections
Processing Applications for Permit to Drill (APDs)
Coordinating with non-BLM Surface Owners
Processing Sundry Notices
Conducting Surface Compliance of Construction Activities
Supervising Site Restoration
Precessing Abandonments
Issuing INCs and other Written Orders for Noncompliance

Production Work

Inspections of Well Testing
Inspections of Site Security
Conducting Surface Compliance of Construction Activities
Processing Sundry Notices
Overseeing Pressure Maintenance Agreements
Reviewing Production Reports
Production Verification
Making Royalty Rate Determinations
Issuing INCs and other Written Orders for Noncompliance

Lease Management

Processing Assignments
Processing Lease Extensions
- For Diligent Development
- By Production
- Using Paying Well Determinations

Taking Action on Bonds
- Approval
- Recommendations
- Releases
- Demands for Performance

Cancellation of Leases

More Explanation concerning Sundry Notices is offered because they cover such a broad spectrum of activities. These activities include:

Flaring and Venting
Off Lease Measurement
Downhole Commingling
Off Lease Commingling
Constructing Pipelines
Workover Operations
Measurement Methods
Plugging and Abandoning Wells
Subsequent Reports of Abandonment
Temporary Abandonments and Shut Ins
Undesireable Events

Also noted was the relationship of the oil and gas program to the realty program, primarily with regard to rights of way.